

Note

Lepisanthes senegalensis (Juss. ex Poir.) Leenh. (Sapindaceae), a new generic and specific record for Queensland

The genus *Lepisanthes* Blume has a wide distribution in the Old World tropics in Africa, Madagascar, Asia, Malesia and northwestern Australia (Reynolds 1985; Leenhouts 1994). A single non-endemic species, *Lepisanthes rubiginosa* (Roxb.) Leenh. has been recorded from the Kimberley region (Reynolds 1985), but is otherwise known from mainland Asia and Malesia (Leenhouts 1994).

In 1994, B. Hyland, formerly botanist at the Australian National Herbarium (QRS) collected an unknown Sapindaceae near Portland Roads on Cape York Peninsula, Queensland. These initial fruiting collections were filed at QRS as *Mischocodon* sp. ? (Claudie River BH 15243) and have also been referred to as *Glenniea* sp. (Claudie River BH 15243). A recent collection of flowering material (Holmes 200) enabled a tentative generic identification of *Lepisanthes* to be made. This was then corroborated by comparison with collections of *Lepisanthes* species at BRI, with the conclusion that the Australian collections were conspecific with *L. senegalensis* (Poir) Leenh. *s.l.*

Lepisanthes senegalensis is a variable ‘superspecies’ and encompasses an extensive list of synonymous taxa (Leenhouts 1969, 1994). The ‘superspecies’ has an extensive distribution in the Old World tropics, being found in tropical Africa, Madagascar, Sri Lanka, the Indian subcontinent, Indo-China and Malesia. It is widespread in New Guinea, with herbarium collections from the southern part of Papua New Guinea in Central, Milne Bay and Western Provinces, in close geographic proximity to north-eastern Australia. Leenhouts (1969) admitted that his polyglot concept for *Lepisanthes senegalensis* may not please everyone “especially for botanists working on the flora of a restricted region....[with]....two or more locally clearly distinguishable forms”. In the advent that a narrower specific concept is taken for the populations in Australia and New

Guinea, then the name *Sapindus cuspidata* Blume based on a *Zippelius* type from New Guinea would have to be considered.

A comprehensive generic description for *Lepisanthes* and a species description for *L. senegalensis* *s.l.* is given by Leenhouts (1994). Illustrations of fruiting material from the Australian population are appearing in the forthcoming book on Australian rainforest fruits by W. & W.T. Cooper.

Lepisanthes senegalensis (Juss. ex Poir.) Leenh., Blumea 17: 85 (1969). *Sapindus senegalensis* Juss. ex Poir., Encycl. 6: 666 (1805); *Aphania senegalensis* (Juss. ex Poir.) Radlk., Sitzungsber. Math.-Phys. Cl. Konigl. Bayer. Akad. Wiss. Munchen 8: 238 (1878). **Type:** Senegal, 30 Sept. 1788, *M. Geoffroy s.n.* (holo: P-JUSSIEU 11386 [3 sheets]); fiche at BRI!).

A comprehensive list of synonyms is given by Leenhouts (1994).

Specimens examined (all BRI): **Philippines.** Samar, Apr 1914, *Ramos* BS1634. **Indonesia.** SW of Tg. Parat, Pulau Panaitan (Prinseneiland), Sep 1951, v. *Borssum Waalkes* 676; SW Java, Ujung Kolon Reserve, Tjibunar, Nov 1960, *Kostermans* UNESCO 96; Gn. Klatakan, W. Bali, Oct 1985, *van Balgooy* 5246; Pulau Kobroor, 6°15’S, 134°17’E, Nov 1994, *van Balgooy* 6856. **Papua New Guinea.** CENTRAL PROVINCE: near Matapaaili Village, Kairuku subdistrict, Jul 1962, *Darbyshire* 690; Fife Bay, Oct 1930, *Turner* 24. MADANG PROVINCE: Gogol River, 5°10’S, 145°25’E, Sep 1969, *Katik* NGF46582; Josephstaal, 4°45’S, 145°00’E, Sep 1958, *White* NGF10247. MOROBE PROVINCE: McAdam Park, East of Wau, 7°20’S, 146°45’E, Dec 1965, *Frodin & Hill* NGF26378; Garagos Creek, 6°40’S, 146°50’E, Oct 1971, *Womersley* NGF43866. WEST NEW BRITAIN PROVINCE: 32 km SW of Linga Linga Plantation, 5°45’S, 149°35’E, May 1973, *Isles & Katik* NGF32271. MILNE BAY PROVINCE: Sabari Is, 11°05’S, 153°05’E, Nov 1965, *Henty* NGF27124; along Dahi River, c. 4 km W of Tapio, Cape Vogel Peninsula, Jul 1954, *Hoogland* 4356; Miadaba, Normanby Island, Esa’ala subdistrict, 9°50’S, 150°50’E, Oct 1971, *Streimann & Lelean* LAE 52599; Biniguni – Maneau track, 9°38’S, 149°18’E, Jul 1972, *Streimann* NGF28806. WESTERN PROVINCE: Fly River, c. 4 miles above Kiunga, 6°05’S, 141°15’E, *Henty* &

Barlow NGF42977; Middle Fly River, 7°06'S, Sep 1967, Pullen 7408. **Australia.** COOK DISTRICT: Chili Creek, Portland Roads road, Aug 2002, Holmes 200; Chili Creek, 12° 39'S, 143° 23'E, Dec 1994, Hyland 15243, 15244.

Typification: Leenhouts (1969) has listed the type for *Sapindus senegalensis* as “*Adanson & Geoffroi fils in herb. Jussieu n. 11386*, Senegal (P, not seen)” and in (1994) as “*Adanson & Geoffroi f. s.n.* (P, Herb. Jussieu 11386), Senegal”. Perusal of the fiche of the three sheets under this number in the Jussieu herbarium, do not indicate any mention of Adanson as a collector. The date 30 Sept. 1788 is also given on the sheets, and is taken here as the date of actual collection in Senegal.

Notes: The presence of this species at Chili Creek, is a further indication of the unusual nature of this locality, both for the presence of this species, and for *Croton caudatus* Geisel, otherwise known from other parts of Malesia and Asia (Forster 2003). The presence of both these species at this site, indicate either an anthropogenic mediated introduction at some time, or long range dispersal. It is unlikely that the populations represent relics from a formerly more widespread occurrence in Australia, as otherwise both should be found in other similar habitats on Cape York Peninsula. *Lepisanthes senegalensis* is used widely as a source of timber and medicine, it also has edible fruit (Leenhouts 1994). Hence it may well have been introduced to this locality either deliberately or inadvertently.

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Distribution and habitat: In Australia this species has been collected only at Chili Creek near Portland Roads from ‘gallery rain forest’ at an estimated altitude of 10 m. This habitat is below the level of annual wet season floods and is inundated on an irregular basis.

Conservation status: The Australian occurrence of this species is apparently a single population, where the species is locally common. Whilst it cannot be considered as an endangered species on a world-wide scale, the restricted Australian occurrence has to be assessed for listing as endangered for the same reasons as the single populations of *Croton choristadenius* K.Schum. and *C. caudatus* (Forster 2003).

References

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- LEENHOUTS, P.W. (1969). A revision of *Lepisanthes* (Sapindaceae). *Blumea* 17: 3–91.
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